

NOAA UAS Program Vision & Strategy



Vision

- UAS observations will become an essential component of the NOAA observing system
 - High Impact Weather Monitoring
 Sensing Hazards with Operational Unmanned Technology (SHOUT)
 - Marine Monitoring
 - · Polar Monitoring
- Assist with the research, development, demonstration and transition to application of select UAS observing strategies
 - Puma-AE is now owned and operated by all of the US Maritime Services, Danes and Dutch
- UAS Research & Development
 - Where? Dull, Dirty, Dangerous, Denied

3 y? - Efficient, Effective, Economical, and vironmentally Friendly

DEC w? - Platforms, Sensors, Applications 2016



NOAA UAS Program Briefs Drone World Expo with NASA and USCG

The NOAA UAS Program briefed the 2016 Drone World Expo in San Jose, CA November 15th to 17th.
Thought leaders, industry experts and end-users gathered at Drone World Expo in the heart of Silicon Valley to present real-world solutions to business and environmental challenges. UASs have provided the capability to

capture data for applications including imaging, photography, video and film, precision agriculture, construction, security and public safety, mapping and surveying, inspections, research and conservation, communications, parcel delivery, humanitarian efforts and more. These operations were explained and demonstrated at this one-of-a-kind gathering. The conference covered UAS strategies, platforms and payloads, data collection, safety, security, privacy, the current regulatory environment, international lessons learned, and the impact drones are having on Geographic Information Systems (GIS), Big Data and the Internet of Things (IoT).

NOAA's Todd Jacobs and John "JC" Coffey were invited to share the NOAA UAS Program's strategic vision and execution from requirements capture to "transition to operations" with NASA and USCG counter-parts. NOAA's recent UAS successes in the focusing on hazardous weather, maritime and Polar surveys included:

- SHOUT's use of Global Hawk for Hurricane Research & Satellite Gap Mitigation
- Puma UAS deploys onboard from US Coast Guard Cutter's (Icebreaker) Healy and Polar Star for marine monitoring, search & rescue and oil spill detection with ONR, AeroVironment.
- Development of partnership with UAF, US Navy, USCG, Conoco Philips for ScanEagle flights in the Arctic.
- NWS' River Forecasting Center Rapid Response with UAS for Yukon River Watch supporting the Targeted Autonomous Insitu Sensing and Rapid Response (TAISRR) CONOPS.
- SBIR Phase III "Transition to Operation" of Aurora Flight Science's Centaur for Grav-D survey.
- UAS use for satellite calibration and validation.
- Other platform coordination including Aerosonde, and Flexrotor.

Is this is an issue of potential concern?

This item has high visibility

Geographic Location (Relevant region, city location) San Jose, CA

Partnering offices OAR, NOAA UAS Program, NOS, CINMS

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